# NJDOT Bureau of Research QUARTERLY PROGRESS REPORT

### Date of report: September 20, 2009 Reporting period: July 1 to September 30, 2009

Project Title:	Technology Transfer Year 21		
RFP NUMBER: NA		NJDOT RESEARCH PROJECT MANAGER: Wladislau (Lad) Szalaj	
TASK ORDER NUMBER: RFCUNY 37		PRINCIPAL INVESTIGATOR: Robert Paaswell	
Project Starting Date: 1/1/2009		Period Starting Date: July 1, 2009	
Project Ending Date: 12/31/2009		Period Ending Date: September 30, 2009	

Activities	% of Total	% of Task this period	% of Task to date	% of Total Complete
In House Lecture Series/Workshops	30%	5%	55%	16.5%
Visiting Scholar Seminar Series	30%	30%	100%	30%
UTRC Research Newsletter	25%	00%	50%	12.5%
Other - General Activities	15%	20%	60%	9%
TOTAL	100%			68%

#### **Project Objective:**

The objectives of the Technology Transfer program are:

- To increase the awareness and level of information concerning transportation issues facing US DOT Region 2 for all within the region;
- To improve the knowledge base and approach to problem solving of the region's transportation workforce, from those operating the systems to those at the most senior levels of managing the system; by doing so, to improve the overall professional capability of the transportation workforce;
- To stimulate discussion and debate concerning the integration of new technologies into our culture, our work and our transportation systems;
- To provide the more traditional but extremely important job of dissemination of research and project reports, studies, analysis and use of tools to the education, research and practicing community;
- To provide unbiased information and testimony to decision-makers concerning regional transportation issues consistent with the UTRC theme.

The goal of the Technology Transfer Program for the New Jersey Department of Transportation is to provide research results to potential users in a form that can be directly implemented, utilized and applied to transportation operations.

#### 1. Progress this period by activities:

- UTRC Research News: The Fall 2009 newsletter is being edited.
- The 2009 UTRC Annual Report is being designed.
- The University Transportation Research Center is inviting proposals for small grants to support transportation education and technology transfer projects across Region 2. The proposals are due to UTRC by October 30, 2009.
- Other General Activities: On May 13 and 14, UTRC has participated at the 2009 NJ TransAction Conference and Exposition held at Atlantic City, NJ
- Two final reports for recently completed projects ("Design and Evaluation of Effective Crosswalk Illumination" by Dr. John Bullough and Dr. Mark Rea, of Rensselaer Polytechnic Institute and "Development of Advanced Modeling Tools for Hotspot Analysis of Transportation Emissions" by Dr. K. Max Zhang and Dr. H. Oliver Gao, of Cornell University) have been sent to national transportation libraries.
- The UTRC website is under constant improvement.
- UTRC and NJDOT have selected and scheduled the following topics for presentation at the NJDOT Offices:

Date	Presenters	Institutions	Topics
15-Sep-09	Sanjay Goel	University at Albany, SUNY	Self-Organized Transport System: Learning from Nature
29-Oct-09	Kaan Ozbay	Rutgers University	The future of Intelligent Transportation Systems with a specific focus on New Jersey
4-Nov-09	Mariana Figueiro	Rensselaer Polytechnic Institute	Light isn't just for vision anymore: implications for transportation safety
12-Nov-09	Thomas Wakeman III	Stevens Institute of Technology	Local Economic Development in New Jersey and the Reach of Global Transportation
19-Nov-09	Anil Agrawal	The City College of New York, CUNY	Effects of Truck Impacts on the Safety of Highway Bridges: A comparative Study with Provisions of AASHTO
24-Nov-09	John Bullough, Mark Rea, and Eric Donnell	Rensselaer Polytechnic Institute and Pennsylvania State University	Roadway Lighting and Safety
1-Dec-09	Hoe Ling	Columbia University	Reinforced Soil Retaining Walls for Highway Application - Seismic Performance

• Dr. Sanjay Goel of the SUNY University at Albany made a presentation on September 15, 2009 at NJDOT Offices. The title of the presentation was: Learning from Birds and Bees: Can Traffic Lights be Taught to Tango? He discussed

preliminary results obtained of his research as a part of the pilot project sponsored by UTRC and current and future efforts in developing the self organized transport system.

#### 2. Proposed activities for next quarter

- Visiting scholar seminars will be planned.
- The Thinking and Doing Breakfast Series Policy Makers Meet Policy Researchers: The Thinking and Doing Breakfast Series are jointly organized by UTRC and The Rudin Center at NYU. This Breakfast Series pair current New York area transportation leaders and practitioners with top academic thinkers to discuss challenging transportation topics: bridging theory with practice.
  On September 30<sup>th</sup>, the first event will be on "The Story of the Highline: A Conversation with Robert Hammond and Professor Ingrid Gould Ellen."

October 28, 2009: Funding Mass Transit: A Conversation with Richard Ravitch and Professor Charles Brecher

**November 25, 2009:** World Class Streets for a World City: A Conversation with NYC Commissioner Janette Sadik-Khan, NYC Chief Designer Alexandros Washburn and Professor/ Vice Chancellor for NYU Abu Dhabi Hilary Ballon

- The Fall 2009 Newsletter will be completed and disseminated
- UTRC will continue to schedule more seminars at NYC and in-house seminars at NJDOT
- Other General Activities: UTRC will continue preparation of reporting documents for submission to USDOT. The UTRC website is still under improvement. UTRC expect to continue to make improvements on the online system for submission and review of proposals. UTRC staff and P.I. will continue to participate at conferences and technical meetings. UTRC's P.I.s will continue to contribute in news articles.

#### 3. List of deliverables provided in this quarter by task (product date)

Final Reports – Completed Research Projects

## 4. Progress on Implementation and Training Activities

NA

## **5. Problems/Proposed Solutions**

NA

## **BUDGET EXPENDED AND REMAINING**

Total Project Budget	\$55,000
<b>Modified Contract Amount:</b>	
Total Project Expenditure to date	\$48,000
% of Total Project Budget Expended	85%